

Data Sheet

# DP730 Series

## PLUS+1<sup>®</sup> Mobile Machine Displays



The Danfoss DP730 Series is an element of the PLUS+1<sup>®</sup> family of mobile machine management products.

The DP730 is designed to perform in the most extreme mobile machine environments.

The DP730 offers three different LCD options to meet your application needs for both in-cab and open usage. The display is equipped with a Projective Capacitive touch screen that works through mud, water and with gloves on.

The latest technology with backlight provides outstanding brightness and contrast performance resulting in an easy-to-read screen. Optically Bonded LCD/Lens Technology improves sunlight view-ability and prevents fogging.

Develop and customize your display using PLUS+1<sup>®</sup> GUIDE and the GUIDE Vector Based Screen Editor (VBSE).

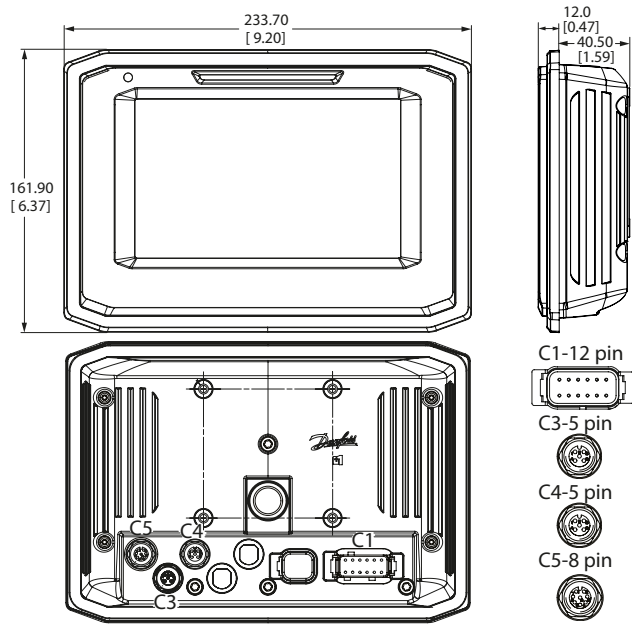


### Features

- 7" High resolution TFT display 800 x 480 pixels, 18-bit colour
- Ideal for gauges, diagnostic menus, and other ancillary functions
- User-programmable with PLUS+1<sup>®</sup> GUIDE (Graphical User Integrated Development Environment)
- Optically bonded LCD
- Projective Capacitive Touch screen
- Video inputs:
  - Two connectors are available for PAL or NTSC signals
  - Only one video input at time can be overlay-ed on screen
- Two multifunction inputs that include DIN/ AIN/FreqIN/Rheo/4-20 mA
- Fully integrated connectors and silicone keypad provide water and dust protection from all sides
- Protective glass provides superior antiglare and contrast control under all light conditions
- Two mounting options:
  - Flush mount in dashboard
  - Stand-alone post mount according to VESA standard: 75 mm x 75 mm (2.953 in x 2.953 in)
- Can be mounted in Portrait or Landscape orientation
- Software configurable LED light bar
- USB port for fast software downloads and uploads
- Integrated light sensor for automatic backlight adjustment
- LCD brightness 400-550cd/m<sup>2</sup>
- LCD contrast from 600:1 to 1000:1
- Digital output for external alarm buzzer
- CE compliant
- On board real-time clock
- 16 MB of flash vault memory (application logging memory)

[Comprehensive technical literature is online at powersolutions.danfoss.com](http://powersolutions.danfoss.com)

DP730 dimensions (mm [in]); C1, C3, C4, C5 connectors



**Pin assignments**

*C1—DEUTSCH DTMO6 12 pin*

Pin	Function	Pins	Function
C1-P1	Power GND -	C1-P7	CAN1 Low - (AIN/DIN)
C1-P2	Power supply +	C1-P8	Sensor power (AIN/DIN)
C1-P3	CAN0 High +	C1-P9	Sensor GND
C1-P4	CAN0 Low -	C1-P10	Multifunction-input
C1-P5	CAN shield/AIN	C1-P11	Multifunction-input
C1-P6	CAN1 High + (AIN/DIN)	C1-P12	DOUT

*C3 and C4—M12 5 pin*

Pin	Function	Pins	Function
C3-P1	Video power GND	C4-P1	Video power GND
C3-P2	Video power supply	C4-P2	Video power supply
C3-P3	Video signal input 1	C4-P3	Video signal input 2
C3-P4	Video signal input GND	C4-P4	Video signal input GND
C3-P5	NC	C4-P5	NC

*C5—M12 8 pin*

Pin	Function	Pins	Function
C5-P1	USB device $V_{BUS}$	C5-P5	USB host GND/RS232 GND
C5-P2	USB device data D-	C5-P6	USB host D+/RS232 RxD
C5-P3	USB device data D+	C5-P7	USB host D-/RS232 TxD
C5-P4	USB device GND	C5-P8	USB host $V_{BUS}$

### Specifications

<b>Processor</b>	ARM11, 532 MHz
<b>RAM</b>	128 MB
<b>FRAM</b>	8 kB
<b>Supply voltage / current consumption</b>	9 to 36 V <sub>DC</sub> / 1 amp at 14 V, 0.5 amp at 28 V
<b>LCD type</b>	TFT with 18 bit resolution
<b>Viewable area</b>	152.40 mm x 91.40 mm [6.00 in x 3.598 in]
<b>IP rating</b>	Front: IP 69K; Rear: IP 67
<b>Operating temperature</b>	-30° C to +60° C [-22° F to +140° F]
<b>Storage temperature</b>	-30° C to +80° C [-22° F to 176° F]
<b>Weight</b>	1000 g [2.2 lb]
<b>Vibration</b>	3.17 g
<b>Shock</b>	50 g
<b>EMC</b>	100 V/m
<b>ESD</b>	15 kV

### Ordering information

Model features and product part numbers

A	B	C	D	E	F	G	H	Part number
DP730	01	02	02	02	02	01	00	11162882
DP730	02	02	02	02	02	01	00	11162884
DP730	03	02	02	02	02	01	00	11162885
DP730	01	02	02	02	02	01	01	11162886
DP730	02	02	02	02	02	01	01	11162887
DP730	03	02	02	02	02	01	01	11162888

Model features		Code	Description
A	Model name	DP730	PLUS+1 <sup>®</sup> Mobile Machine Displays
B	LCD options	01	Value - transmissive
		02	Standard - transmissive
		03	High performance—Transmissive-Enhanced View TFT
C	Touchscreen options	02	Projective capacitive touch
D	Input / output options	02	User configurable
			1 CAN, 2 AIN/DIN, 2 DIN/AIN/FreqIn/Rheo/4-20 mA IN, DOUT 2 CAN, 2 DIN/AIN/FreqIn/Rheo/4-20 mA IN, DOUT
E	Flash memory / application key	02	512 MB / without application key
F	USB port type	02	USB device rear / USB host rear or front
G	Application log (vault memory)	01	16 MB
H	Bezel color	00	Black
		01	Gray

*Related products*

<b>Related product</b>	<b>Part number</b>
Panel mounting kit	11144800
DEUTSCH 12 pin mating connector kit 20 AWG	10100944
DEUTSCH 12 pin mating connector kit 16 to 22 AWG	10102025
Mating connector kit with camera cable	11130520
USB cable (device only)	11130518
USB cable (device and host)	11130519